

# **S60HC3T**

# **Schottky Barrier Diodes 30V**, **60A**

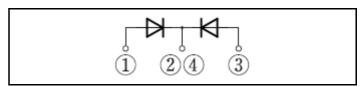
### **Feature**

- · High Recovery Speed
- $\bullet \ Low \ V_F$
- Pb free terminal
- RoHS:Yes

## **OUTLINE**



# **Equivalent circuit**



**Absolute Maximum Ratings** (unless otherwise specified : Tc=25°C)

| Item                            | Symbol              | Conditions  | Ratings    | Unit |
|---------------------------------|---------------------|---|------------|------|
| Storage temperrature            | Tstg                |   | -55 to 125 | °C   |
| Junction temperature            | Tj                  |   | 125        | °C   |
| Repetitive peak reverse voltage | $V_{RRM}$           |   | 30         | V    |
| Average forward current         | I <sub>F</sub> (AV) | 50Hz sine wave, Resistance load, Rating for each diode IF(AV)/2, Tc=112°C | 60         | А    |
| Surge forward current           | I <sub>FSM</sub>    | 50Hz sine wave, Non-repetitive, 1cycle, Peak value, Tj=25°C               | 650        | А    |
| Surge forward current           | I <sub>FSM1</sub>   | tp=1ms, Sine wave, Non-repetitive 1 cycle peak value, Tj=25°C             | 1150       | А    |
| Mounting torque                 | TOR                 | (Recommended torque : 0.5N·m)   | 0.8        | N∙m  |

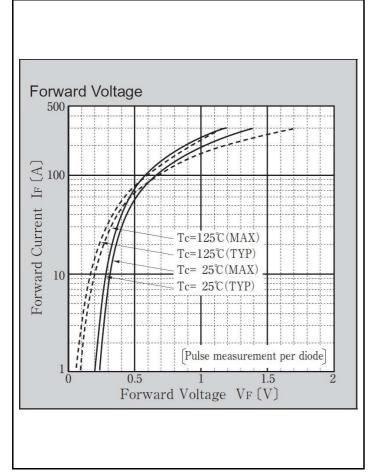
<sup>\* :</sup> See the original Specifications

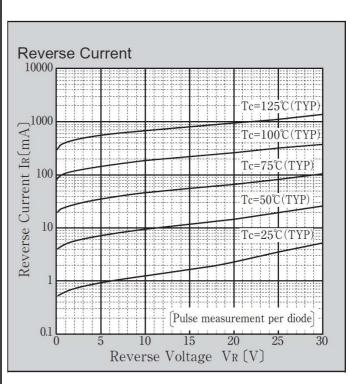
# **Electrical Characteristics** (unless otherwise specified : Tc=25°C)

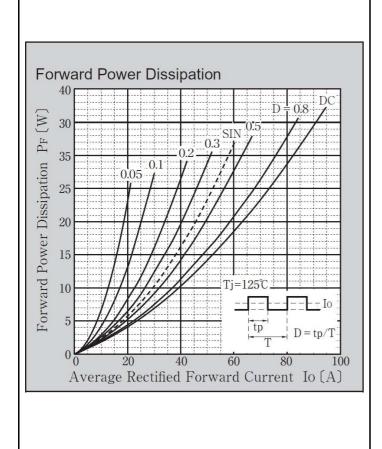
| Item               | Symbol         | Conditions                           | Ratings |      |     | Unit |
|--------------------|----------------|--------------------------------------|---------|------|-----|------|
|                    |                |                                      | MIN     | TYP  | MAX |      |
| Forward voltage    | V <sub>F</sub> | IF=30A, Pulse measurement, per diode |         | 0.37 | 0.4 | V    |
| Reverse current    | I <sub>R</sub> | VR=30V, Pulse measurement, per diode |         |      | 20  | mA   |
| Total capacitance  | Ct             | f=1MHz, VR=10V, per diode            |         | 1100 |     | pF   |
| Thermal resistance | Rth(j-c)       | Junction to case                     |         |      | 0.3 | °C/W |

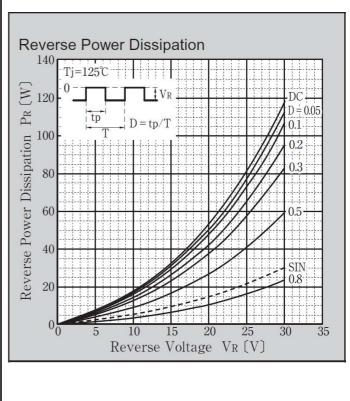
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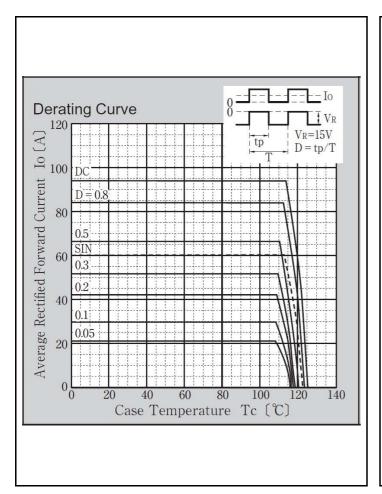
# **CHARACTERISTIC DIAGRAMS**

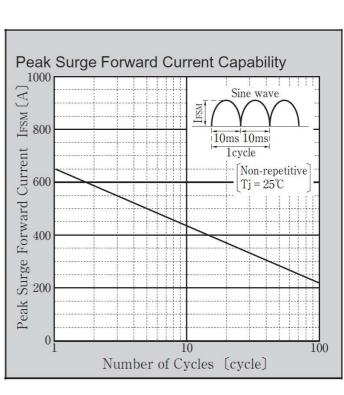


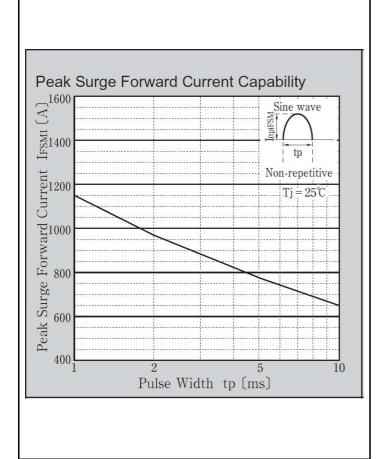


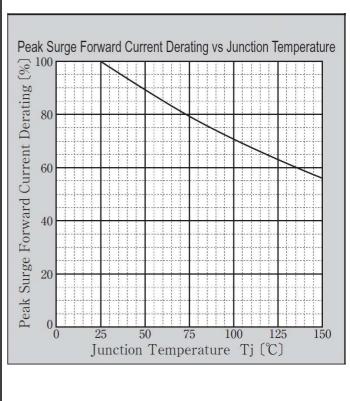


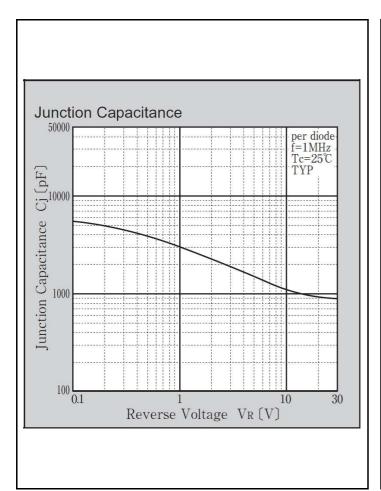


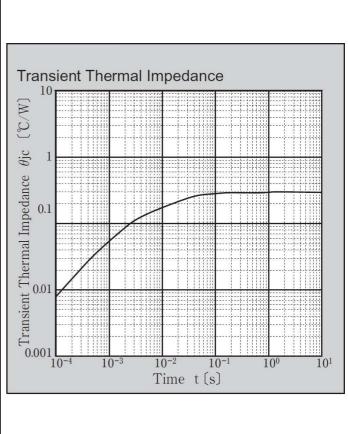










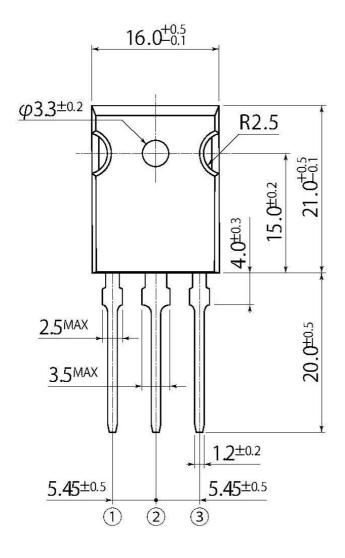


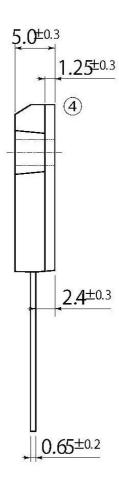
unit:mm

scale: 2/1

K5

| JEDEC Code | TO-247AD      |  |  |
|------------|---------------|--|--|
| JEITA Code | 1             |  |  |
| House Name | MTO-3PT(3pin) |  |  |





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